MEMORANDUM

DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE PUBLIC HEALTH SERVICE

NATIONAL INSTITUTES OF HEALTH

The Record

DATE: March 30, 1977

FROM

Michael Adler, J.D.

Division of Legislative Analysis

SUBJECT:

Summary of First Day of Hearings of Thornton House Subcommittee on Science, Research, and Technology

The following members of the Subcommittee were present for some portion of the hearing: Harkin (D-Iowa), Brown (D-Calif.), Forsythe (R-N.J.), Ottinger (D-N.Y.), and Fugua (D-Fla.). Representative Thornton (D-Ark.), the Chairman, and Representatives Hollenbeck (R-N.J.) and Krueger (D-Texas) were present for the entire time and commented and asked questions in the final portions.

In a word, the session had the air of a graduate or post-graduate seminar. Mr. Thornton made clear from the beginning that "unlike ... other Congressional hearings which are directed toward specific legislative proposals, this Subcommittee's interests deal more with the basic science policy questions. We wish to provide a forum in which we all may learn and discuss and even disagree...."

The witnesses, Maxine Singer, Ray Curtiss, Emmett Barkley, Charles Lewis, and George Wald presented their testimony seristum. After all had testified, they were individually invited to respond to what each of the others had said. Dr. Singer described the basic process of DNA technology, what it enables scientists to study, and why other methodologies are not as useful. Drs. Barkley and Curtiss discussed physical and biological containment, respectively; both stressed the high margins of safety provided by the NIH Guidelines. Dr. Lewis reviewed the science of genetics in use in the field of agriculture over the last several decades and stated his belief that the new recombinant DNA technology has great potential for practical application in agriculture. Pr. Wald did not have a prepared statement but reiterated his, by now, well-known views on the possibilities and gravity of altering three billion years of evolution. He felt all Pl experiments were harmless and should have no restrictions, while all the work requiring the P2 level of containment should be done at P3 facilities away from population centers. He stated his concern that private industry had a "hidden agenda" in agreeing to abide by the NIH Guidelines, since the Guidelines were designed for research but he feared industry would use them to cover production.

A profound atmosphere of decorum pervaded the session throughout. On several occasions, Mr. Thornton politely clarified points made by witnesses and exhibited a grasp of many technical issues and facts. The session was conducted at a high level of scientific sophistication as well as genuine courtesy and respect for all participants. None of the Committee members appeared to have any sort of ax to grind.

Mr. Hollenbeck inquired about a scientific interchange which had occurred recently at an NIH meeting between Robert Ryan and others (none of the witnesses knew of the specific occasion). He also asked about a fairly new hypothesis being tested by Crick, Brenner et al. concerning recombination as it occurs in nature. Mr. Hollenbeck wondered about a change in the world status of U.S. science if we were to slow down recombinant DNA research here.

Recognizing it was only guesswork, Representative Krueger asked what the chances were of grave genetic damage resulting from this work. He wondered about whether biological containment was effective and whether it limited the conduct of the research. The extent of the work being carried out in the U.S. and the costs and cost effectiveness of constructing P4 facilities were also subjects of his questions. He seemed to show much sensitivity to the importance of maintaining scientific freedom and to the problems which could result from overburdening the scientific enterprise with too many regulations. Mr. Thornton, too, stated that he was much impressed with the possibility that, should conducting the research be made too difficult, lesser able investigators might gravitate to other parts of the world where there was less regulation, a possibility which would only increase the danger for us all. He also noted the research is not so difficult that it could not be conducted in rather rudimentary labs by college students.

cc: Dr. Fredrickson Dr. Perpich